

PTO/SB/08A (08-03)

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**INFORMATION DISCLOSURE
STATEMENT BY APPLICANT**

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Sheet 1 of 5

Complete if Known

Application Number	10/796236
Filing Date	March 8, 2004
First Named Inventor	Guanghua G. Zhang
Art Unit	Not yet assigned
Examiner Name	Not yet assigned
Attorney Docket Number	PEN-106/US

U. S. PATENT DOCUMENTS					
Examiner Initials*	Cite No. ¹	Document Number	Publication Date MM-DD-YYYY	Name of Patentee or Applicant of Cited Document	Pages, Columns, Lines, Where Relevant Passages or Relevant Figures Appear
		Number-Kind Code ² (if known)			
I.A.		US- 5,166,668	11-24-1992	Aoyagi	
A		US- 5,239,489	08-24-1993	Russell	
		US- 5,434,371	07-18-1995	Brooks	
		US- 5,764,611	06-09-1998	Watanabe	
		US- 5,786,804	07-28-1998	Gordon	
		US- 5,850,058	12-15-1998	Tano et al.	
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		US- 5,981,884	11-09-1999	Sato et al.	
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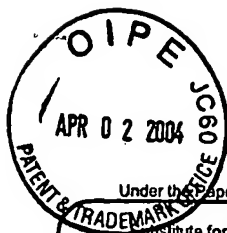
FOREIGN PATENT DOCUMENTS					
Examiner Initials*	Cite No. ¹	Foreign Patent Document	Publication Date MM-DD-YYYY	Name of Patentee or Applicant of Cited Document	Pages, Columns, Lines, Where Relevant Passages Or Relevant Figures Appear
		Country Code ³ Number ⁴ Kind Code ⁵ (if known)			
		JP 6-67,799	03-11-1994	Munemasa	
		WO-02/17222-A2	02-28-2002	IBM	

Examiner Signature	<i>[Signature]</i>	Date Considered	11/26/05
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Sheet 2 of 5

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Application Number	10/796236
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First Named Inventor	Guanghua G. Zhang
Art Unit	Not yet assigned
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Attorney Docket Number	PEN-106/US

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		Number-Kind Code ² (if known)			
I.A.		US- 6,330,057 B1	12-11-2001	Lederer et al.	
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I.A.		US- 2003/0063200 A1	04-03-2003	Isoyama	

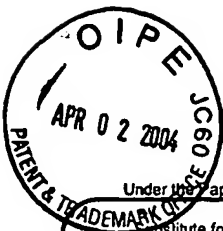
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Examiner Signature	<i>Karla B.</i>	Date Considered	11/26/05
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Sheet	3	of	5
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**Examiner
Signature**

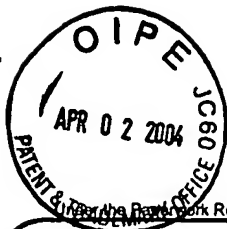
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Attorney Docket Number	PEN-106/US

Sheet 4 of 5

NON PATENT LITERATURE DOCUMENTS

Examiner Initials*	Cite No. ¹	Include name of the author (in CAPITAL LETTERS), title of the article (when appropriate), title of the item (book, magazine, journal, serial, symposium, catalog, etc.), date, page(s), volume-issue number(s), publisher, city and/or country where published.	T ²
I.A.	-	AIT-AIDER ET AL., "Adaptation of Lowe's Camera Pose Recovery Algorithm to Mobile Robot Self-Localisation", Robotica 2002.	
A	1	AIT-AIDER ET AL., "Model to Image Straight Line Matching Method for Vision-Based Indoor Mobile Robot Self-Location", IROS 2002, Lausanne, 30 Sept. - 4 Oct.	
	✓	ANSAR ET AL., "Linear Pose Estimation from Points or Lines", ECCV 2002, LNCS 2353, pp. 282-296, Springer-Verlag Berlin Heidelberg 2002.	
	△	BATISTA ET AL., "Pose View Stability Analysis for Camera Look Angles Computation", Institute of Systems and Robotics - Dep. of Elec. Engineering, Univ. of Coimbra, Portugal.	
	-	FAUGERAS, Three-Dimensional Computer Vision: A Geometric Viewpoint, Cambridge, MA: MIT Press 1993. ISBN 262-06158-9	
		GOLDSTEIN, ET AL., Classical Mechanics, 3rd Edition, Addison Wesley 2002.	
		SCHRAMM ET AL., "Computer Graphic Simulation of Light Reflection from Paper", IS&T PICS Conference, 1998, pp.412-423.	
		SCHROERING ET AL., "A New Input Device for 3D Sketching", Washington University in St. Louis.	
✓		SHRIKHANDE AND STOCKMAM, "Surface Orientation from a Projection Grid", PAMI (11), No. 6, June 1989, pp. 650 - 655.	
I.A.		TRUCCO, EMANUELE, VERRI, ALESSANDRO, Introductory Techniques for 3-D Computer Vision, New York: Prentice Hall 1998. ISBN 0-13-261108-2	

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Sheet 5 of 5

NON PATENT LITERATURE DOCUMENTS

Examiner Initials*	Cite No. ¹	Include name of the author (in CAPITAL LETTERS), title of the article (when appropriate), title of the item (book, magazine, journal, serial, symposium, catalog, etc.), date, page(s), volume-issue number(s), publisher, city and/or country where published.	T ²
I-A		UDE, "Nonlinear Least Squares Optimisation of Unit Quaternion Functions for Pose Estimation from Corresponding Features", Conf. Pattern Recognition, Brisbane, pp425-427 Aug 98	
I-A		WANG ET AL., "Computation of Surface Orientation and Structure of Objects Using Grid Coding", PAMI (9), No. 1, January 1987, pp. 129 - 137.	

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